Meeting Notes
NORTH DELTA IMPROVEMENTS GROUP MEETING
Wednesday, April 6, 2005
9:30-11:30 a.m. at Jones & Stokes (2600 V Street)

ATTENDANCE LIST:

Aramburu, Margit	Delta Protection Commission
Burkholder, Brad	California Department of Fish and Game
Clark, Robert	California Central Valley Flood Control Association
Crouch, Craig	Sacramento County Water Agency
Dutton, Bill	US Bureau of Reclamation
Elliott, Chris	Jones & Stokes
Fleenor, Bill	UC Davis
Hadl, Stefan	KCRA-TV
Harvey, Tom	US Fish and Wildlife service
Hoppe, Walt	Point Pleasant
King, Lincoln	California Department of Water Resources
Kirkham, Bill	Franklin Pond
Knittweis, Gwen	California Department of Water Resources
Kramer, Dan	Robertson-Bryan
Kreinberg, Grant	Sacramento Area Flood Control Agency
Martin, Sara	Jones & Stokes
Mello, Steve	Reclamation District 563
Simons, Rachel	East Bay Municipal Utility District
Trieu, Don	MBK Engineers
Van Loben Sels, Topper	North Delta Water Agency and Delta Protection Commission
Whitener, Keith	The Nature Conservancy
Wilson, Daniel	Delta Protection Commission

HANDOUTS

- Meeting Agenda
- Meeting Notes from the February 16, 2005 meeting
- North Delta Mike 11 modeling results handout packet

1. INTRODUCTIONS – Gwen Knittweis, DWR

Gwen Knittweis welcomed everyone to the meeting, facilitated a round of introductions, and extended Curt Schmutte's apologies for his absence. Ms. Knittweis reviewed the agenda and handouts and took care of a few housekeeping items. She called attention to the sign-in sheet circulating the room, and encouraged those who are not currently on the North Delta e-mail reflector to make an "add me to the reflector" note next to their name on the sign-in sheet if they would like to receive meeting notices directly. She then requested comments on the February 16 meeting notes. None were suggested.

Ms. Knittweis announced that there had been some staffing changes at DWR North Delta—two project team members have left for other opportunities. Collette Zemitis has taken a position with CalTrans in Bishop. Interviews are underway with a great batch of applicants to fill her shoes as the staff environmental scientist. Monica Martin has taken a job in St. Louis, and DWR will be interviewing applicants for a water resources engineer as well.

2. HYDRAULIC MODELING RESULTS PRESENTATION – Bill Fleenor, UC Davis

Ms. Knittweis turned the meeting over to Bill Fleenor of UC Davis (UCD) for presentation of the latest batch of Mike 11 modeling results, including results from 1997 hydrology, new 1986 hydrology, and for more frequent, less intense flood event modeling runs. *The modeling results can be seen in the accompanying PDF file "06 Apr 05 Modeling Results".*

Mr. Fleenor then began his presentation of the new 1986 hydrology modeling results with each of the flood control options. A meeting attendee asked if up-to-date descriptions of the alternatives are available on the project website. Ms. Knittweis indicated that she would double-check the website to ensure the most recent version of the alternatives description document has been posted.

Mr. Fleenor pointed out that they have now modeled the weirs at 9 feet for flood control options #2 and #3. He also explained that the model is using 1986 hydrology and current stream channel geometry to see how a flood of that magnitude would behave in today's system. Unfortunately, the Morrison Creek stream group remains somewhat of an unknown for the 1986 hydrology, as only the data available for Morrison Creek are the daily flow numbers.

Mr. Fleenor called attention to flood control option #1, which consistently shows the best benefit as far as flood flow detention is concerned, because it is positioned with the best access to direct flows. Topper Van Loben Sels asked about the relative cost of each flood control option. Ms. Knittweis responded that a cost estimation process is currently underway, and that information will be available at a later time. Mr. Fleenor pointed out that each flood control option has different benefits depending on whether you are downstream or upstream of the mitigation.

Don Trieu mentioned that a set of modeling results for 1986 hydrology was presented at the February NDIG meeting. He asked what refinements had been made to the model between the February meeting and the current meeting. Mr. Fleenor answered that two refinements had been made:

- In the previous modeling runs, an incorrect datum was being used at McConnell. The problem has now been rectified.
- The model did not originally include Morrison Creek data. That data has since been added to the model.

Grant Kreinberg inquired as to what values were being used to represent Morrison Creek flow. Mr. Fleenor indicated that they are using the values that Don Trieu developed for the HEC-1 model of the Morrison basin. He explained that they didn't initially visit the Morrison Creek area in the Mike 11 model because they were mainly looking at low flow events. They feel comfortable with the '97 data for that area, but are looking for better '86 data. The flows are locally significant, but not regionally significant in the model. Mr. Kreinberg said he had found some problems with the hydraulics and hydrology of the values developed for the HEC-1 model, and has corrected data that he volunteered to share it with Mr. Fleenor if he was interested.

Mr. Van Loben Sels asked why stage at Lambert Road increased with each of the flood control options compared to the "1986 Flood" stage. Mr. Fleenor responded that the best comparison would be with the "1986 No Failures" stage because it does not include any levee failures or "accidental detention". Margit Aramburu requested adding a footnote to the modeling results indicating which

levees failed under the "1986 Flood" hydrology (including how much water each failure took out of the system) to aid in understanding the difference between "1986 Flood" and "1986 No Failures".

Mr. Fleenor moved on to the 1997 hydrology modeling results, which also happen to have the best numbers for flows in Morrison Creek. In 1997, the peak stages were not as high for as long compared to the 1986 hydrology, so the 1997 hydrology results in less water detained on Staten Island under flood control option #1 compared to 1986. Mr. Fleenor explained that the 1997 event is currently the "flood of record", and is therefore by definition cumulatively greater than a 100-year event. Because of the complexity of the North Delta system, different streams may experience different storm event classifications during the same storm. So the 1997 event was a 100-year event on some streams in the system, a 130-year event on others, and so on.

Looking at the modeling results, Daniel Wilson observed that the dredging option appeared to provide the most overall stage reduction. Mr. Fleenor agreed, but drew attention to the fact that dredging might not be sustainable, and has negative effects downstream.

Daniel Wilson asked why the weir on Staten Island in flood control option #1 had to stay at 10 feet. He feels that the project team should look at flooding Staten even more often than the 1 in 10 year original agreement allows, since that agreement applied to flooding the entire island. The alternatives being considered now flood only relatively small portions of the island, leaving great crane habitat on about 80% of the island. Ms. Knittweis said that his point was well taken.

A meeting attendee inquired as to the amount of overtopping one might expect at Lambert Road under the various flood control options. Mr. Fleenor said that his rough predictions would be approximately 2,253 acre-feet using the 1986 hydrology, and approximately 2,496 acre-feet using the 1997 hydrology. Mr. Kreinberg, Walt Hoppe, and Craig Crouch were concerned that the data at Lambert Road was off. They felt like more water would be flowing over the road—Mr. Hoppe said that the 1986 or 1987 Corps report showed 13,000 acre-feet flowing over Lambert in '86, and Mr. Crouch said that Stein Buer's report for the North Delta Programmatic EIR showed 12,000 acre-feet flowing over the road during that flood.

Mr. Fleenor next presented the modeling results for the 1998, 1999, and 2000 hydrology, each very common, low-flow flood events. The largest of the three events was the 1998 event, which has been classified as a 10-year storm event. Mr. Wilson asked why, if it was a 10-year event, there was no flooding of Staten Island under any of the alternatives. He thought the weir height had been selected to provide detention during 10-year and greater storm events. Mr. Fleenor clarified that the 1998 event was considered a "10-year storm system event", but that the 10-year return interval for Staten Island is determined by stage at the New Hope gage, and the opening up of McCormack-Williamson Tract lowers stage at that gage.

Mr. Wilson felt that a 9-foot weir for flood control option #1 might make more sense, if a 10-foot weir would not allowing the island to flood during actual 10-year storm events. Mr. Crouch agreed, stating he felt that the weir height should not be constrained to pre-project stage. Mr. Whitener pointed out that modeling results were shown using a 9-foot weir for flood control option #1, and it did not provide for a significant additional amount of detention. Ms. Knittweis volunteered to look up those modeling results and share them back with the group at the next meeting. Mr. Hoppe cautioned that a too-low weir could cause the basin to fill up before a flood peak hits. Mr. Wilson proposed that in that case, the team design a second weir to flood the rest of the island. Ms.

Knittweis indicated that they would be analyzing stage duration during post-processing of the modeling results.

3. ENVIRONMENTAL DOCUMENTATION UPDATE – Gwen Knittweis, DWR

Ms. Knittweis announced that the most notable development regarding environmental documentation for the project is the refinement of the project description to reflect project phasing. This phasing is a more realistic approach to the project, in light of current funding availability and schedule feasibility. She described the potential components of the two primary phases as follows:

Phase 1

- Ecosystem restoration and flood control options on McCormack-Williamson Tract
- Grizzly Slough restoration
- Dredging and levee raising on Mokelumne River
- Potential relocation of the New Hope Marina

Phase 2

- Staten Island flood control and ecosystem enhancement
- Maximized dredging and levee-raising

The project team still plans to prepare a NEPA-friendly CEQA document, in case a federal sponsor becomes involved. Phase 1 will be analyzed at the project-level, and Phase 2 will be analyzed at the available level of detail.

Ms. Aramburu opposed the phasing of the project unless Phase 1 is able to meet the flood control goals of the project, in case Phase 2 never gets built. She pointed out that the funding of the project depends on the validity of the project, and that the validity of the project is based on meeting both ecosystem restoration and flood control goals. Chris Elliott indicated that Phase 1 does meet the flood control goals of the project in that it mediates the surge effect in the North Delta.

Steve Mello agreed with Ms. Aramburu, observing that it has become a recent trend for ecosystem restoration projects to promise flood control improvements "at a later time" but never get to that stage. Ms. Knittweis clarified that M-W actions were both flood and ecosystem because of the flood surge benefits and because Phase 1 also included some dredging and levee-raising. Ms. Knittweis said that preliminary cost estimates show that the Phase 1 actions will cost roughly$20 and $40 million, whereas Phase 2 actions will cost an additional $100 to $140 million. She feels that the project team has received a clear message from stakeholders that they want to look into short-term incremental benefits as well as a long-term more aggressive solution, and the improvements to McCormack-Williamson Tract (Phase 1) are much more likely to get funded and implemented in a shorter amount of time.

Ms. Aramburu asked for clarification on the intent of the phasing, as it sounds like saying the project will be split into two phases is basically saying there will never be a phase 2. Chris Elliott clarified that phasing gives the environmental document flexibility but does not preclude phases happening simultaneously or independently. Mr. Crouch acknowledged that it will be a monumental challenge to secure the permits for phase 2, but feels that the phases need to be permitted together. He pointed out that there is already a small degree of suspicion around the table that the unspoken agenda is purely restoration-focused. He and Ms. Aramburu believe the decisions regarding funding and

timing need to be made on the other end of the environmental analysis. Mr. Crouch also feels that it is unrealistic to assume the project could get built without NEPA compliance.

Mr. Van Loben Sels feels that it is imperative for this project to demonstrate that it offers equal benefits for both the ecosystem restoration and flood control communities when it goes before congress. Mr. Wilson recommended that enough flood control elements to keep everyone in the North Delta happy and safe should be included in phase 1, since chances are a phase 2 will never get built.

Mr. Kreinberg asked if the phases would be able to stand alone, could phase 2 possibly be implemented first? Mr. Elliott answered that each phase would be self-mitigating.

Additional questions were raised about cost, and Ms. Knittweis explained that the project team is currently working on conceptual designs and more detailed cost estimates. The designs should be done by the end of May, and the estimates sometime thereafter. Ms. Aramburu suggested tabling further discussion about phasing until more detailed cost information is available. At that point, the NDIG can fully embrace its role as an advisory stakeholder group.

4. NEXT MEETING

The next meeting was scheduled for Wednesday, May 18, from 9:30 a.m. to 11:30 a.m. at Jones & Stokes. Ms. Knittweis indicated that she would provide some of the preliminary cost estimate information (previously performed) at the next meeting.